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10/771,469	02/05/2004	Hideki Kabune	01-547	2958

23400 7590 12/27/2006  
POSZ LAW GROUP, PLC  
12040 SOUTH LAKES DRIVE  
SUITE 101  
RESTON, VA 20191

EXAMINER
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RIAD, AMINE

ART UNIT	PAPER NUMBER
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2113

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
3 MONTHS	12/27/2006	PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.



### **Detailed Action**

Claims 1-15 have been presented for examination.

Claims 1-6 and 9-15 have been rejected.

Claims 7 and 8 have been objected to.

#### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-6,9-15 are rejected under 35 U.S.C. 102(e) as being anticipated by  
Gabara Patent Application Publication 2003/0043748.

In regard to claims 1 and 12,

Gabara discloses an electronic control unit comprising:

- A microcomputer; (Figure 1; Item 104) [Examiner considers item 104 FSM as microcomputer]
- A first internal timer and a second internal timer, (Figure 1; item 102) & (Page 2; Paragraph 23; "the DLL 102 also generates a divided by two clock signals") [because timer 102 includes a second clock to time captures inputs, Examiner considers it as second timer]

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- The microcomputer includes a first input capture function for capturing a time of the first internal timer at which an edge of a square wave input signal is detected (Figure 1; Item 112-1 & 112-2) [Gabara discloses capturing data, Examiner considers time as data]
- The microcomputer further includes a second input capture function for capturing a time of the second internal timer at which the edge of the square wave input signal is detected (Figure 1; item 112-3 & 112-4) [Gabara discloses capturing data, Examiner considers time as data], and the microcomputer diagnoses at least one of the first and the second capturing functions by performing comparison between the time of the first internal timer and the time of the second internal timer. (Page 1; Paragraph 7; “ The comparison circuit is configured to compare output signals generated by the first and second data capture elements, and supplies a result of the comparison back to the controller”)

In regard to claims 2, 9 and 13,

Gabara discloses the electronic control unit according to claim 1, wherein the first internal timer and the second internal timer are configured in one timer. (Figure 1; item 102) [Both clock timers are within the same item 102]

In regard to claims 3, 10 and 14;

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Gabara discloses the electronic control unit according to claim 1, wherein the first internal timer and the second internal timer are independently configured. (Item 102; DDL 102 has two timers  $ck$  and  $ck/2$ )

In regard to claims 4, 11 and 15,

Gabara discloses the electronic control unit according to claim 1, wherein: the control of the actuator is disabled when one of the input capture function is determined as abnormal; the actuator is saved in a safe position; and the abnormal input capture function is reported. (Page 1; Paragraph 7; "The controller repeats the selection of particular test data and monitors corresponding comparison results until set-up and hold –times or other clocking characteristics of the first data capture element are determined to a desired level elements") [Examiner considers that When Gabara disclose repeat Gabara saves and reports before another test is submitted which matches with claim 4 ]

In regard to claim 5,

Gabara discloses an electronic control unit comprising:

- A microcomputer for controlling an actuator; Figure 1; Item 104) [Examiner considers item 104 FSM as microcomputer]
- A first internal timer and a second internal timer; (Figure 1; item 102) & (Page 2; Paragraph 23; "the DLL 102 also generates a divided by two clock signals")
- A switching means, (Page 2; Paragraph 27; "the data capture circuit 100 has two modes of operation, a first or regular (R) mode, and second or self test mode ")

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- Wherein the microcomputer includes a first input capture function for capturing a time of the first internal timer at which an edge of each of square wave input signals is detected, the microcomputer performs calculation for the control of the actuator based on the time of the first internal timer, (Figure 1; Item 112-1 & 112-2) [Gabara discloses capturing data, Examiner considers time as data]
- The switching means selects the square wave input signals in orderly sequence for capturing, (Page 2 & 3; Paragraph 28 and 29)
- The microcomputer further includes a second input capture function for capturing a time of the second internal timer at which the edge of the selected square wave input signal is detected, (Figure 1; item 112-3 & 112-4) [Gabara discloses capturing data, Examiner considers time as data]
- The microcomputer diagnoses at least one of the first and the second capturing functions by performing comparison between the time of the first internal timer and the time of the second internal timer. (Page 1; Paragraph 7; “ The comparison circuit is configured to compare output signals generated by the first and second data capture elements, and supplies a result of the comparison back to the controller”)

In regard to claim 6,

Gabara discloses the electronic control unit according to claim 5, wherein the switching means is provided outside the microcomputer. (Figure; items 104 and 102) [It is clear that the switching is done at 102 not at 104 considered as the microcomputer]

***Allowable Subject Matter***

Claims 7 and 8 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Response to Amendment***

The declaration filed on November 9, 2006 under 37 CFR 1.131 has been considered but is ineffective to overcome the U.S. Patent Publication No. 2003/0043748 to Gabara reference.

The evidence submitted is insufficient to establish a conception of the invention prior to the effective date of the Gabara reference. While conception is the mental part of the inventive act, it must be capable of proof, such as by demonstrative evidence or by a complete disclosure to another. Conception is more than a vague idea of how to solve a problem. The requisite means themselves and their interaction must also be comprehended. See *Mergenthaler v. Scudder*, 1897 C.D. 724, 81 O.G. 1417 (D.C. Cir. 1897).

Examiner acknowledges receiving Exhibit A containing 4 pages.

Pages 1, 2, 3, and 4 of Exhibit A contain what it appears to be a foreign language, and hand written notes in English letters. Examiner informs that applicant, did not show diligence in the completion of the invention, from time prior to the date of the reference

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continuously up to the date of actual reduction to practice or up to the date of filing the application. Examiner reminds Applicant that, in order to do so, Applicant must either show:

- 1) conception of the invention prior to the effective date of the reference coupled with due diligence from prior to the reference date to a subsequent reduction to practice, or;
- 2) conception of the invention prior to the effective date of the reference coupled with due diligence from prior to the reference date to the filing date of the application

Examiner is unable to determine what the hand written notes mean.

Examiner also notes in page 3 of Exhibit A, there is what it appears to be Figure one of the Application. Page 3 of Exhibit A is not a clear explanation as to how it is related to the claim language. In Summary Examiner cannot determine at least a relation between the Exhibit submitted, and the Application as claimed.

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a). A shortened statutory period for reply mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.



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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Amine Riad whose telephone number is 571-272-8185.

The examiner can normally be reached on 8-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert Beausoliel can be reached on 571-272-3645. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the

AR  
Amine Riad  
Patent Examiner  
12/12/06

